

"Abbotts" Parker Through Truss Bridge
Spanning Sandusky River at Abbott Road (CR 33)
Tiffin vicinity
Seneca County
Ohio

HAER No. OH-48

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PHOTOGRAPHS

WRITTEN HISTORICAL AND DESCRIPTIVE DATA

Historic American Engineering Record
National Park Service
U. S. Department of the Interior
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HISTORIC AMERICAN ENGINEERING RECORD

Abbotts Parker Through Truss Bridge

HAER No. OH-48

Location: 7.1 miles north of Tiffin, County Route 33 over Sandusky River, Pleasant Township, Seneca County, Ohio

UTM Coordinates: 17/320140/4564040

Date of Construction: 1897

Present Owner: County of Seneca
Board of Commissioners
Seneca County Courthouse
Tiffin, Ohio

Present Use: Vehicular traffic

Significance: This bridge is a typical example of a Parker through truss and is the last bridge to be built in Seneca County by Massillon Bridge Company. The bridge is an example of a truss configuration developed for intermediate spans of 170-220 feet, and represents a product of one of Ohio's many prolific bridge building companies. These companies specialized in prefabricated metal truss bridge construction in the last quarter of the 19th century. The bridge is listed by the Ohio Department of Transportation in its inventory evaluation and historical plan, and the county government has asked for federal funding to assist in replacing the bridge.

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Ohio Historic Bridge Project
Summer 1986

"Abbotts" Bridge possesses features that characterize the Parker Through Truss. This truss type resembles the older Pratt truss in that diagonals absorb tensile stress and verticals, except for hip verticals adjacent to the inclined end-posts, are in compression. The polygonal upper chord distinguishes the Parker truss from the Pratt Truss which has parallel top and bottom chords. As with other through trusses, the superstructure rises above and over the deck. The main Parker Truss rests on concrete and stone abutments, with a clear span of 187 feet while the overall span of the bridge, including approaches, is 218 feet. The roadway measures 15 feet in width. Two channels with top plate and bottom lacing comprise the top chords. The end posts also have top plate channels and bottom lacing. Flat eye bars form the bottom chords, and the posts are two channels connected with lacing bars. Flat eye bars also form the diagonals, and the bridge is pin connected.¹

This bridge received its name from Lyman Abbott, owner of the land surrounding it. The county government began preparations in 1895 for building the bridge. In May of that year, the Seneca County Board of Commissioners began awarding contracts for the bridge. Martin & Jones received a contract to provide the stonework at \$6.70 per perch, using Berea sandstone. The commissioners awarded James O'Brien a contract for

the superstructure. However, the bridge plaque reveals that Massillon Bridge Company completed the bridge in 1897. Massillon Bridge Company was a very prolific bridge builder in Seneca County before 1897. However, contracts let to Massillon Bridge Company after that year disappeared from county records, indicating that this was the last bridge that they built in Seneca County. Massillon Bridge entered into a bridge trust with several other companies in 1897, and the trust assigned territories to member companies. Seneca County may well have been included in the trust's assignment of territories, and Massillon Bridge may have been precluded from bidding on bridges in the county (See "Forder Pratt Through Truss Bridge, HAER OH-42").

Massillon Bridge Company began in Massillon, Ohio, under the leadership of Joseph Davenport. Davenport was born in Newton, Massachusetts, in 1815. As a young man, he worked as a coach maker's apprentice and later as a coach maker. His employer began specializing in railroad cars, and Davenport developed a cowcatcher (he failed to patent it) and designed a closed cab for locomotives. Davenport moved to Massillon in 1850 where he invented a steam driven car, a forerunner of the street car. He became partners with C. M. Russell and founded Davenport, Russell & Company, that built and repaired railroad cars from 1852 to 1856. The Company was revived in 1860, and it became known as Russell & Co. in

1864 when it began manufacturing farm machinery. Davenport founded the Massillon Bridge Company in 1869. He designed and patented the first wrought iron cantilever in the United States. Davenport retired in 1875 and died in 1912.³ Massillon Bridge Company was created in 1869, but the business environment of the era necessitated that Davenport incorporate the company. In 1873, the State of Ohio chartered Massillon Bridge Company with a capital stock of \$75,000. Officers included A. S. Sprague, president, H. A. Williams, vice president, W. C. Jacobs, secretary and treasurer, and H. H. Hilton, superintendant. The company steadily grew, and the capital increased to \$150,000 by 1903. At that time, residents of Toledo gained majority control of the bridge company, and it moved to Toledo and was renamed Toledo-Massillon Bridge Company. C. D. Yost became manager and continued as secretary-treasurer after the company returned to Massillon in 1909. In 1909, Elton Rice became president and general manager, and J. C. Corns became vice-president. The capital increased to \$450,000 in 1909. During World War I, the company's plant was converted to ship building, and the first ship built was christened the U.S.S. Massillon Bridge. Fort Pitt Bridge Works of Pittsburgh purchased the company in 1933, and C. D. Yost again became plant manager. The plant closed in 1943.⁴

In recent years, Abbotts Bridge has suffered severe structural

problems. On November 25, 1969, the Seneca County Board of Commissioners contracted with Claude Brown & Associates to provide estimates for the replacement and relocation of the bridge.⁵ The commissioners intended to replace the bridge in 1972, but they postponed the project after the federal government denied the county funds to assist in the undertaking.⁶ In 1975, the commission hired OhioBridge Corporation to make necessary repairs to the bridge. The contractor spent \$64,964 to construct a new north abutment and replace the deck, stringers, floor beams, hangers, and lower lateral floor beam hangers, and truss bracing and repair truss end posts, truss bearings, lateral brace rods, steel floor joists, connecting angles and plates. The original estimate for the work was \$79,830.⁷ Despite the extent of these repairs, the bridge still has serious problems. The county government again is seeking state and federal assistance to replace the bridge.

NOTES

1 Abbotts Bridge - Seneca County, Historic Property Inventory, Historic Preservation Office, Ohio Historical Society, Columbus, Ohio.

2 Ohio, County of Seneca, Board of Commissioners, Commissioners Journal (1895) 13:236, 241, 253-254, 257.

3 Wrought Iron Bridge Co., Bridge Files, Historic Preservation Office, Ohio Historical Society, Columbus, Ohio.

4 Edward T. Heald, The Stark County Story, 4 vols. (Canton, Ohio, Stark County Historical Society, 1949-1959), 1:628-634.

5 Ohio, County of Seneca, Office of the County Engineer, Bridge Journal (1969) 1:517.

6 Interview with Preston Spencer, Seneca County Engineer, Tiffin, Ohio, 15 July 1986.

7 Ohio, County of Seneca, Office of the County Engineer, Abbotts Bridge, Bridge Files.

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Spencer, Preston. Seneca County Engineer, Tiffin, Ohio. Interview, 15
July 1986.